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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/045,207	10/22/2001	Phillip Hua-Kuan Wang	11001-2-US	2248

7590

10/20/2003

Alfred H. Muratori
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EXAMINER

HUG, ERIC J

ART UNIT	PAPER NUMBER
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1731

DATE MAILED: 10/20/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/045,207	WANG, PHILLIP HUA-KUAN	
	Examiner	Art Unit	
	Eric Hug	1731	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 22 October 2001.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-9 is/are pending in the application.
- 4a) Of the above claim(s) 5-9 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-4 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 22 October 2001 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☒ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s). _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Election/Restrictions

Restriction to one of the following inventions is required under 35 U.S.C. 121:

- I. Claims 1-4, drawn to a method of aligning an optical fiber with an optical device, classified in class 385, subclass 98.
- II. Claims 5-9, drawn to a method of connecting a first optical device with a first housing to a second optical device with a second housing, classified in class 65, subclass 406.

The inventions are distinct, each from the other because of the following reasons:

Inventions I and II are unrelated. Inventions are unrelated if it can be shown that they are not disclosed as capable of use together and they have different modes of operation, different functions, or different effects (MPEP § 806.04, MPEP § 808.01). In the instant case the different inventions achieve different objectives, namely invention I achieves alignment of optical devices via rotational means and invention II achieves a connection between the optical devices via a soldering technique.

Because these inventions are distinct for the reasons given above and the search required for Group I is not required for Group II, restriction for examination purposes as indicated is proper.

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During a telephone conversation with Alfred Muratori on October 1, 2003, a provisional election was made without traverse to prosecute the invention of group I, claims 1-4.

Affirmation of this election must be made by applicant in replying to this Office action. Claims 5-9 are withdrawn from further consideration by the examiner, 37 CFR 1.142(b), as being drawn to a non-elected invention.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

1. Claims 1-4 are rejected under 35 U.S.C. 102(b) as being anticipated by Kiryuscheva et al (US 5,859,947). Kiryuscheva discloses a positioning device for aligning optical devices. The device provides for alignment through angular rotations about two or more axes of rotation (column 2, lines 1-9). The device can be operated in a manner whereby the axes of rotation are mutually perpendicular. For example, in a two axes configuration, the first axis of rotation is substantially perpendicular to the second axis of rotation and the first axis of rotation intersects the second axis of rotation at the alignment point (column 2, lines 60-63). Also, the device has at least one axis of symmetry which substantially coincides with at least one of the axes of rotation (column 2, lines 64-67). The device provides for more than two axes of rotational alignment, therefore reads on the claimed first, second, and third axis of rotation.

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2. Claim 1 is rejected under 35 U.S.C. 102(b) as being anticipated by Itoh et al (US 4,986,843). Itoh discloses an apparatus for aligning and fusion splicing optical fibers. The device aligns the fibers by means of three-dimensional translation of the fibers along the x, y, and z axes, and additionally by rotation of fibers about their longitudinal axis. See particularly Figure 3 for an illustration of the axes of alignment.

3. Claims 1-2 are rejected under 35 U.S.C. 102(b) as being anticipated by Pierson (US 5,812,258). Pierson discloses an optical coupler for rotational alignment of two optical components. The coupler comprises eccentric sleeves which not only rotates at least one of the optical components about its longitudinal axis, but also provides for changing the angle of the axis of one of the optical components relative to the other. The result is motion in five axes, three being translational and two being rotational (see column 4, lines 5-36). The angle is formed at the junction of the two optical components, therefore the two axes of rotation intersect at the joining ends of the components.

4. Claim 1 is rejected under 35 U.S.C. 102(b) as being anticipated by Borner et al (US 3,800,388). Borner discloses an apparatus for aligning two optical components along a common axis, whereby each component is rotated about its optical (longitudinal) axis with respect to each other until the components are aligned.

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The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. NOTE: Each of these references teach rotational orientation of an optical component about its longitudinal axis in regards to optical alignment or fusion with another optical component.

Takahashi et al (US 6,467,973)

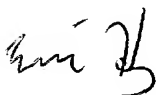
Hulten et al (US 6,151,919)

Rickman et al (US 6,212,320)

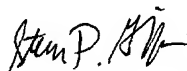
Any inquiry concerning this communication or earlier communications from the examiner should be directed to Eric Hug whose telephone number is 703 308-1980. The examiner can normally be reached on Monday through Friday, 9:00 AM to 6:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Steven Griffin can be reached on 703 308-1164. The fax phone number for the organization where this application or proceeding is assigned is (703) 872-9306.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703 308-0651.



jeh



STEVEN P. GRIFFIN
SUPERVISORY PATENT EXAMINER 2
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